

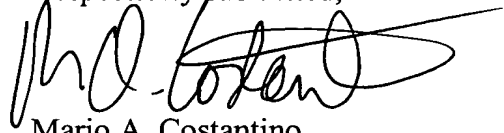
Claims 1-16 stand rejected under 35 U.S.C. §103(a) over U.S. Patent No. 6,169,603 to Takayama. This rejection is respectfully traversed.

Applicants submit herewith accurate, verified translations of the priority applications for this application (Japanese Application No. 10-227065 filed August 11, 1998 and Japanese Application No. 10-248902 filed September 3, 1998). Since the claims of the present application are supported by the priority documents, and the filing dates of the priority documents are prior to the November 25, 1998 U.S. filing date of Takayama, Takayama is not available as a reference against this application. Accordingly, Applicants submit that the rejection over Takayama should be withdrawn.

In view of the foregoing, Applicants respectfully submit that this application is in condition for allowance. Favorable consideration and prompt allowance are earnestly solicited.

Should the Examiner believe anything further would be desirable to place this application in even better condition for allowance, the Examiner is invited to contact Applicants' undersigned attorney at the telephone number set forth below.

Respectfully submitted,



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MAC/ccs

Attachments:

Appendix
Amendment Transmittal
Petition for Extension of Time
Information Disclosure Statement
Verified Translation of Japanese Application No. 10-227065
Verified Translation of Japanese Application No. 10-248902

Date: September 26, 2002

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<p>DEPOSIT ACCOUNT USE AUTHORIZATION Please grant any extension necessary for entry; Charge any fee due to our Deposit Account No. 15-0461</p>

APPENDIX

Changes to Claims:

Claims 17-26 are added.

The following is a marked-up version of the amended claims:

1. (Amended) A stage device, comprising:

a movable stage which has a first portion to support an object and a second portion;

a drive mechanism which drives said movable stage in at least a first direction, at least part of the drive mechanism being coupled to said second portion;

a first position detector which detects ~~the~~a position of said first portion in a predetermined first direction, said first position detector being optically connected to said first portion; and

a second position detector which detects ~~the~~a position of said second portion in said predetermined first direction, said second position detector being optically connected to said second portion.

2. (Amended) The stage device according to claim 1, further comprising:

a stage controller which controls said drive mechanism based on ~~a~~a detection ~~result~~results obtained by said first position detector and said second position detector.

5. (Amended) An exposure apparatus which transfers a pattern of a mask onto an object, comprising:

an object stage which has a first portion to support said object and a second portion;

a drive mechanism which drives said object stage in at least a first direction, at least part of the drive mechanism being coupled to the second portion;

a first position detector which detects ~~the~~a position of said first portion in a predetermined first direction, said first ~~portion~~position detector being optically connected to said first portion; and

a second position detector which detects ~~the~~a position of said second portion in said predetermined first direction, said second position detector being optically connected to said second portion.

6. (Amended) The exposure apparatus according to claim 5, further comprising:

a stage controller which controls the drive mechanism based on a detection result obtained by said first position detector and said second position detector.

10. (Amended) The exposure apparatus according to claim ~~4~~5, further comprising a second drive mechanism which drives said object in a direction different from said first direction.

11. (Amended) An exposure device which exposes a pattern of a mask onto a substrate, comprising:

a mask stage which positions said mask;

a substrate stage which positions said substrate;

a position detecting device which detects ~~the~~a position of at least one of said mask stage and said substrate stage, said position detecting device having a moving mirror fixed to at least one of said mask stage and said substrate stage, and a fixed mirror fixed to a reference unit;

a correction device which corrects for differences which result from vibration of said fixed mirror; and

a control device which controls the position of said mask stage and said substrate ~~stages~~stage in at least one direction based on an output from said correction device.

13. (Amended) The exposure device according to claim 11, wherein said position ~~detection~~detecting device detects the position of at least one of said mask stage and said substrate stage based on light reflected by ~~at~~the fixed mirror ~~arranged in a reference unit~~, and light which is reflected by ~~at~~the moving mirror ~~disposed in at least one of said mask stage and said substrate stage~~, said position detection device including a correction device which corrects for an error which originates from vibration of said fixed mirror, and a control device which controls said mask and substrate stages based on an output from said correction device.

15. (Amended) The exposure device according to claim 13, wherein said correction device is one which corrects for said error based on stage instruction signals which dictate movement of said mask and substrate stages.

16. (Amended) A method of manufacturing an exposure device, comprising the steps of:

providing a stage device having a first stage which movably supports an object;

providing a drive mechanism which drives said first stage in at least a first direction, said first stage having a first portion coupled to said drive mechanism and a second portion for supporting said object, said first stage device ~~configured with~~including a first position measuring device which measures ~~the~~a position of said first portion in a predetermined measurement direction; and

providing a first stage control system which controls said drive mechanism to control the position of said object in said at least a first direction based on a measurement result obtained by said first position measuring device; and

~~assembling said stage device, said drive mechanism, and said stage control system to produce a corresponding exposure device.~~